



Institut für Industriebetriebslehre und Industrielle Produktion (IIP) Lehrstuhl für Betriebswirtschaftslehre insb. Produktionswirtschaft und Logistik

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Master Thesis

At the Chair of Business Administration, the working group Project and Resource Management in the Built Environment is eligible for a thesis on the following topic:

Development and application of a method for regional prediction of future europe-wide end-of-life glass fibre reinforced plastics (EoL-GFRP) waste streams from the automotive industry

Background

This thesis aims to improve an existing cross-sectoral optimization of EoL-GFRP from the wind and automotive industries. In addition to landfilling, EoL-GFRP waste treatment and subsequent co-incineration as a substitute fuel and raw material in a cement plant is currently the only economical solution for using GFRP waste. In order to operate future GFRP processing centres in Europe both economically and in a way that conserves resources, it is necessary to predict the expected GFRP waste streams as accurately as possible.

Contents of the thesis

The aim of this thesis is to develop and apply a method for regional forecasting (NUTS-2) of future europeanwide GFRP waste streams from the automotive industry. For this purpose, approximations can be carried out, accompanied by statistical uncertainty analyses based on e.g. census data as well as capacities of the automotive waste disposal centres. The aim is to review the state of research and determine the GFRP waste stream at European NUTS level 2 by 2035.

Requirements

Special previous knowledge in the field of waste management and waste generation estimation is not necessary. Good comprehension and independence for research are required. The offer is mainly aimed at students of industrial engineering, but also at students of other disciplines.

Contact

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